

## CLAIMS

1. Use of the combination of:
  - a first compound which is lysine, or an amino acid or other proteinaceous moiety having a free amino group with a pKa substantially similar or equal to that of lysine, or pharmaceutically acceptable salts or carboxyl derivatives thereof, and
    - a second compound, which is a positively charged compound, or pharmaceutically acceptable salts or carboxyl derivatives thereof,
- 5 for the preparation of a composition for inhibiting renal uptake of substances, in particular proteins or peptides, that may be damaging to the kidneys, and that are used
- 10 for therapeutical or diagnostic purposes.
- 15 2. Use as claimed in claim 1, wherein the positively charged second molecule is a positively charged amino acid, or pharmaceutically acceptable salts or carboxyl derivatives thereof.
- 20 3. Use as claimed in claim 2, wherein the positively charged amino acid is selected from the group consisting of arginine, ornithine and citrulline, or pharmaceutically acceptable salts or carboxyl derivatives thereof.
- 25 4. Use as claimed in claims 1-3, wherein the first compound is lysine selected from D-lysine, L-lysine or poly-lysine.
- 30 5. Use as claimed in claims 1-4, wherein the first compound is lysine and the second compound is arginine.
- 35 6. Use as claimed in claims 1-5, wherein the amount of the first compound is 10-45 grams, preferably 15-35 grams, more preferably 20-30 grams, most preferably about 25 grams per treatment.
7. Use as claimed in claims 1-6, wherein the amount of the second compound is 15-45 grams, preferably 15-35 grams, more preferably 20-30 grams, most preferably about 25 grams per treatment.

8. Use as claimed in claims 1-7, wherein the first compound is lysine in an amount of about 25 grams and the second compound is arginine in an amount of about 25 grams per treatment.

5 9. Use as claimed in claims 1-8, wherein the two compounds are administered in about 1 L infusion fluid over a period of about 4 hours.

10 10. Use as claimed in claims 1-9, wherein the substances that may be damaging to the kidneys, and of which the renal tubular uptake is to be inhibited are proteins, peptides or monoclonal antibodies, in particular proteins, peptides or monoclonal antibodies that are inherently toxic, that are coupled to a radionuclide, a cytostatic agent, a toxic agent, a metal, or a combination thereof, or cytostatic agents and nephrotoxic antibiotics per se.

15 11. Therapeutical composition for the inhibition of the renal uptake of substances, in particular proteins or peptides, that may be damaging to the kidneys and that are used for therapeutical or diagnostic purposes, which composition comprises one or more pharmaceutically acceptable excipients, carriers or diluents and a combination of

20 - a first compound which is lysine, or an amino acid or other proteinaceous moiety having a free amino group with a pKa substantially similar or equal to that of lysine, or pharmaceutically acceptable salts or carboxyl derivatives thereof, and

25 - a second compound, which is a positively charged compound, or pharmaceutically acceptable salts or carboxyl derivatives thereof.

30 12. Therapeutical composition as claimed in claim 11, wherein the positively charged second molecule is a positively charged amino acid, or pharmaceutically acceptable salts or carboxyl derivatives thereof.

35 13. Therapeutical composition as claimed in claim 12, wherein the positively charged amino acid is selected from the group consisting of arginine, ornithine

and citrulline, or pharmaceutically acceptable salts or carboxyl derivatives thereof.

14. Therapeutical composition as claimed in claims 11-13, wherein the first compound is lysine 5 selected from D-lysine, L-lysine or poly-lysine.

15. Therapeutical composition as claimed in claims 11-14, wherein the first compound is lysine and the second compound is arginine.

16. Therapeutical composition as claimed in 10 claims 11-15, wherein the amount of the first compound is 10-45 grams, preferably 15-35 grams, more preferably 20-30 grams, most preferably about 25 grams per treatment.

17. Therapeutical composition as claimed in 15 claims 11-16, wherein the amount of the second compound is 15-45 grams, preferably 15-35 grams, more preferably 20-30 grams, most preferably about 25 grams per treatment.

18. Therapeutical composition as claimed in 20 claims 11-17, wherein the first compound is lysine in an amount of about 25 grams and the second compound is arginine in an amount of about 25 grams per treatment.

19. Therapeutical composition as claimed in claims 11-18, wherein the two compounds are present in about 1 L infusion fluid.

25 20. Method for inhibiting the renal uptake of proteins or peptides, that are used for therapeutical or diagnostic purposes, in a subject, which method consists of the administration of a therapeutical composition as claimed in claims 11-19.

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